

There were no particles of fruit found in any of the stomachs. Cotton was planted in an adjacent field which held its foliage until late in the season offering an ideal place for hibernation of boll weevils in the thicket, nevertheless none of these insects were found in any of the stomachs taken. It was found that the White-throated Sparrow consumed most of its food before 10:00 A. M. each day as the per cent of the daily ration indicated when taken at different times of the day.

Migration. This bird is a winter resident in this part of the country and very careful observations are required to determine the date of its first arrival. The birds that come first are usually few in number and the recognition of its song is almost more important than sight, due to the secretive habits of the birds when they first come south. Later, as the numbers increase, they seem to lose their timidity and are easily observable. A considerable amount of time is required in the field in order to detect the first arrival.

During the season of 1924-25, the first birds arrived on October 14, gradually increasing in numbers until by November 15, there were a great number present. These stayed through the mild winter until the middle part of April. The last record of a White-throated Sparrow was on April 25, 1925.

During the season of 1925-26, the first bird observed was on October 5, 1925, with the numbers gradually increasing. There were never many birds present due to the severe winter and most of them kept in the protected woods, venturing out only when the temperature climbed and the prospects were for a bright day. The winter quota of birds was reached about November, and the birds started to leave toward the end of April, the last one being heard on May 7. In general, the time of arrival and departure is very close year after year, the temperature condition governing the dates and also the number of birds in a locality.

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HOME LIFE OF THE BLACK TERN IN WISCONSIN

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Another season of studying the Black Tern (*Clidonias nigra surinamensis*) came to a close on our last trip to the nearest colony of these birds at Big Muskego Lake, Waukesha County, Wisconsin, on July 24, 1926. Early in June Mr. J. Jeske, Assistant Artist of the Milwaukee Public Museum, Mr. R. Doughty, bird lover and photogra-

pher, my wife and myself, made preparations for week-end trips to obtain better pictures and more interesting facts concerning the home life of the Black Tern, and to do some banding. Our first trip was taken on June 6, a day of continuous squalls; but masses of black clouds, accompanied by high winds, and rain with thunder and lightning, did not discourage our happy crew as we poled our boats through the marsh taking an occasional soaking. We located the nest of a Black Tern containing three eggs, and anchored the boats about ten feet distant. A number of birds were hovering and circling about overhead screaming their loudest at this intrusion. Neither parent bird was bold enough to descend to the nest. Just then came a shower, and as the first drops of rain pattered down, there was the faithful parent bird on the nest, squatting down firmly with wings slightly open to effectually shed the water. Moving about in our boats to sponge out the water, and covering ourselves with newspapers failed to frighten the little mother facing the rain as it beat down upon her. The rain had barely ceased when up flew this timid little guardian.

Contrary to this on the very next trip I found a very bold defender of a nest containing two eggs and one newly hatched young. Rounding a small bog of wild rice, I came upon this nest which was ideally located for a picture. My companions and I were considerably surprised at the boldness of this mother bird. We had just anchored the boat and focused on the nest eight feet distant when down came the bird screaming and much agitated. Her object it seemed was to drive the youngster away from the nest into hiding. In this she succeeded, although she kept up an almost rhythmic performance of hovering, dropping to the nest, tucking in her wings, then springing into the air to circle overhead and repeat the performance. To really test her boldness we moved the boat nearer and anchored again so that the lens of the Graflex was not more than four feet from the nest. This did not in any way deter the tern from coming down to the nest every few seconds, in fact she calmed down to the extent of settling down on the eggs for short intervals, her screaming also diminishing to a throaty scolding. It was then that the young wanderer came back to the nest to snuggle down under his mother.

In my experience the first instinct of the parent bird when approached, is to shoo the little ones from the nest into hiding. One can almost definitely say, even before locating the nest, whether it contains all eggs or one or more young birds, by the cries of the hovering birds. It is then in seeking the young birds, that one must

hurry through and around the bogs in order to arrive before the complete disappearance of the youngsters which themselves are so distracted they will climb over the edge of the nest and take any direction from it. paddling along hurriedly over lily pads, and dodging through the rushes. The parent birds swoop down then and give the escaping youngsters quite a sharp peck at the back of the head, which hurries them into hiding. Immediately upon entering the edge of a bog, or the merest semblance of one, the little one will stop suddenly and rest immovable. If one now anchors his boat remaining in sight of the nest, but a reasonable distance away, a young bird (a week old or less) will invariably return to the nest in a short time. All young Black Terns until they are able to fly are easily overtaken with a row boat. A dip net, oval in shape, eight inches long, six inches wide, and four inches deep, attached to a pole thirty inches long, is a very convenient accessory for the purpose of lifting them out of the water for banding. Young terns on the water cannot swim faster than a person can row, and as they do not dive their capture becomes an easy task when it occurs in open water.

On June 20 we found quite a number of young Pied-billed Grebes swimming about, but when we tried to approach them they immediately dived and swam under water. We eventually succeeded in capturing two of them, and took some pictures. Releasing them we decided to watch their antics and accordingly set the prow of the boat into a convenient bog. We had hardly settled when an excited tern, who saw us moving about spied the young grebe and swooped down to drive it away from us. Is it possible that this tern mistook the grebe for a young tern?

During the hottest part of the day Black Terns are rather inactive, at which time they frequently come down to their nests, to sit or stand over the eggs, shading them from the sun. A few birds, perhaps the males, are seen flying about in search of food.

On June 27 we observed a nest with two newly hatched young and one pipped egg. Returning to the nest one hour and forty minutes later we saw that the third egg had hatched, the nest now containing three downy young, brown in color with black spots on their backs, white faces with beady eyes, black bills and webbed feet. All egg shells had been promptly removed and I can truly say, of the hundreds of Black Tern nests observed, empty or containing young, I have never seen egg shells, or other foreign matter in or about them.

MILWAUKEE, WISCONSIN.